

CLAIMS

Please amend claims 1, 37, 55, 73, 90, and 95 as follows.

1. [Currently Amended] An apparatus for use in a wireless remote site monitoring system, comprising:

a sensor configured to obtain data that is of an environmental nature; [and]

a control board configured to receive and process the data from a variety of types of data collection devices, place the data into at least one packet, and transmit the at least one packet from the control board using wireless communications;

a battery configured to provide primary power to the control board; and

a solar panel configured to recharge the battery.

2. [Original] The apparatus as in claim 1, wherein the sensor is a digital sensor.

3. [Original] The apparatus as in claim 1, wherein the sensor is an analog sensor.

4. [Original] The apparatus as in claim 3, further comprising an analog to digital converter linked to the control board.

5. [Original] The apparatus as in claim 2, wherein the digital sensor is compatible with a protocol selected from the group consisting of serial data interface twelve (SDI-12) protocol, 12C, RS-232 and RS-432.

6. [Previously Amended] The apparatus as in claim 1, further comprising a processor configured to place the data into a single packet to be transmitted.

7. [Previously Amended] The apparatus as in claim 6, wherein the data comprises information from a plurality of digital sensors.

8. [Previously Amended] The apparatus as in claim 6, wherein the data comprises information from a plurality of analog sensors.

9. [Previously Amended] The apparatus as in claim 6, wherein the data is comprised of sensor data from an analog sensor and a digital sensor.

10. [Previously Amended] The apparatus as in claim 1, further comprising temperature sensor linked to a microprocessor in the control board.

11. [Original] The apparatus as in claim 10, wherein the temperature sensor measures the temperature of the environment around the apparatus.

12. [Previously Amended] The apparatus as in claim 10, wherein the temperature sensor measures the temperature of the environment around a microprocessor in the control board.

13. [Previously Amended] The apparatus as in claim 1, further comprising a voltage sensor linked to a microprocessor in the control board.
14. [Previously Amended] The apparatus as in claim 13, wherein the voltage sensor measures the voltage of a solar/battery system.
15. [Original] The apparatus as in claim 1, wherein the sensor monitors a condition.
16. [Original] The apparatus as in claim 15, wherein the condition is a liquid level.
17. [Original] The apparatus as in claim 15, wherein the condition is a temperature.
18. [Original] The apparatus as in claim 15, wherein the condition is the presence of a liquid.
19. [Previously Amended] The apparatus as in claim 6, wherein the sensor comprises the digital sensor that transmits the data concerning a condition to a microprocessor in the control board.
20. [Original] The apparatus as in claim 19, wherein the data is compressed by the microprocessor.

21. [Previously Amended] The apparatus as in claim 20, wherein the compressed data is transmitted to a base station or General Packet Radio Service/Global System for Mobile Communication (GPRS/GSM) gateway.

22. [Original] The apparatus as in claim 21, wherein the data is transmitted from the microprocessor to the wireless system through a port.

23. [Previously Amended] The apparatus as in claim 22, wherein the wireless system is a telemetry radio or General Packet Radio Service/Global System for Mobile Communication (GPRS/GSM) modem.

24. [Original] The apparatus as in claim 22, wherein the port is selected from the group consisting of a parallel port and serial port.

25. [Previously Amended] The apparatus as in claim 21, wherein the base station or the GPRS/GSM gateway decompresses the compressed data.

26. [Original] The apparatus as in claim 19, wherein the data is an N-byte wide message.

27. [Original] The apparatus as in claim 26, wherein the N-byte wide message is a maximum of 96 bytes.

28. [Original] The apparatus as in claim 26, wherein the N-byte wide message is a maximum of 512 bytes.

29. [Previously Amended] The apparatus as in claim 26, wherein the N-byte wide message is comprised of a header and sensor data.

30. [Previously Amended] The apparatus as in claim 29, wherein the data is an environmental condition.

31. [Previously Amended] The apparatus as in claim 30, wherein the environmental condition is selected from the group consisting of liquid level, temperature and a presence of a liquid.

32. [Previously Amended] The apparatus as in claim 19, wherein the data is transmitted to a base station or Global System for Mobile Communication/General Packet Radio Service (GSM/GPRS) gateway.

33. [Previously Amended] The apparatus as in claim 32, wherein the data is stored on a memory device.

34. [Original] The apparatus as in claim 25, wherein the server interprets the data.

35. [Original] The apparatus as in claim 34, wherein the data is stored on a memory device.

36. [Previously Amended] The apparatus as in claim 35, wherein the data is stored based upon an identifier associated with the sensor.

37. [Currently Amended] A method for collecting sensor data from a remote sensor in conjunction with the telemetry radio, the method comprising:

retrieving the sensor data from a sensor wherein the sensor is of the type selected from the group consisting of a digital sensor and analog sensor and the sensor data is of an environmental nature;

compressing the sensor data with a control board into at least one packet; [and]

transmitting the at least one packet from the control board to a server[.]; and

providing primary power to the control board from a battery and a solar panel.

38. [Original] The method as in claim 37, further comprising retrieving additional sensor data from more than one sensor.

39. [Original] The method as in claim 38, wherein the additional data is compressed into the packet with the sensor data.

40. [Previously Amended] The method as in claim 37, further comprising decompressing the sensor data at the server.

41. [Previously Amended] The method as in claim 39, wherein the packet contains a message N-bytes wide.

42. [Previously Amended] The method as in claim 41, wherein N-bytes is a maximum of 96 bytes.

43. [Previously Amended] The method as in claim 41, wherein N-bytes is a maximum of 512 bytes.

44. [Previously Amended] The method as in claim 41, wherein the N-bytes wide message comprises a header and sensor data.

45. [Original] The method as in claim 44, wherein the sensor data is comprised of data from more than one sensor.

46. [Previously Amended] The method as in claim 37, wherein the digital sensor and the control board are compatible with a protocol selected from the group consisting of serial data interface (SDI-12), I2C, RS-232 and RS-432.

47. [Original] The method as in claim 45, wherein the more than one sensors each contain a unique identifier.

48. [Previously Amended] The method as in claim 37, further comprising storing the sensor_data at the server.

49. [Previously Amended] The method as in claim 48, further comprising allowing the sensor data to be accessed.

50. [Previously Amended] The method as in claim 49, wherein the sensor data can be accessed remotely.

51. [Original] The method as in claim 50, wherein remotely is through a computer network.

52. [Original] The method as in claim 51, wherein the computer network is the Internet.

53. [Original] The method as in claim 51, wherein the computer network is a wide area network

54. [Previously Amended] The method as in claim 51, wherein the computer network is a local area network.

55. [Currently Amended] A system for collecting sensor data from a remote sensor in conjunction with a telemetry radio, the system comprising:

means for sensing the sensor data wherein the means for sensing is of the type selected from the group consisting of a digital and an analog and the sensor data is of an environmental nature;

means for retrieving the sensor data from the sensor;

means for compressing the sensor data into at least one packet; [and]

means for transmitting the at least one packet from the retrieving means to a server[.];

and

means for providing primary power through a battery and a solar power.

56. [Original] The system as in claim 55, further comprising means for retrieving additional sensor data from more than one sensing device.

57. [Original] The system as in claim 56, wherein the additional data is compressed into the packet with the sensor data.

58. [Original] The system as in claim 55, further comprising means for decompressing the data at the server.

59. [Previously Amended] The system as in claim 55, wherein the packet contain a message N-bytes wide.

60. [Previously Amended] The system as in claim 57, wherein N-bytes is a maximum of 96 bytes.

61. [Original] The system as in claim 57, wherein N-bytes is a maximum of 512 bytes.

62. [Previously Amended] The system as in claim 59, wherein the N-bytes message comprises a header and sensor data.

63. [Original] The system as in claim 59, wherein the sensor data is comprised of data from more than one sensor.

64. [Previously Amended] The system as in claim 55, wherein the means for sensing is compatible with sensor protocol selected from the group consisting of serial data interface (SDI-12), 12C, RS-232 and RS-432.

65. [Original] The system as in claim 63, wherein the more than one sensors each contain a unique identifier.

66. [Previously Amended] The system as in claim 55, further comprising means for storing the sensor data at the server.

67. [Previously Amended] The system as in claim 66, further comprising means for allowing the sensor data to be accessed.

68. [Previously Amended] The system as in claim 67, wherein the sensor data can be accessed remotely.

69. [Original] The system as in claim 68, wherein remotely is through a computer network.

70. [Previously Amended] The system as in claim 69, wherein the computer network is the Internet.

71. [Original] The system as in claim 69, wherein the computer network is a wide area network

72. [Previously Amended] The system as in claim 69, wherein the computer network is a local area network.

73. [Currently Amended] An apparatus for reviewing data from a remote site monitoring device, the apparatus comprising:

a storage device that stores the data which is received in at least one packet from the remote site monitoring device wherein the data is of an environmental nature;

a remote access linked to the storage device, the remote access configured to permit access through a computer network; and

an output, linked to the storage device, that displays the data.

74. [Original] The apparatus as in claim 73, further comprising a microprocessor, linked to the

storage device.

75. [Previously Amended] The apparatus as in claim 74, wherein the microprocessor decompresses the packet of the data.

76. [Original] The apparatus as in claim 73, further comprising a search function that enables the data to be searched.

77. [Previously Amended] The apparatus as in claim 73, wherein the output displays the data in a preferred manner.

78. [Previously Amended] The apparatus as in claim 77, wherein the preferred manner lists the data by a unique identifier.

79. [Original] The apparatus as in claim 77, wherein the preferred manner is the location of the remote site monitoring device.

80. [Previously Amended] The apparatus as in claim 77, wherein the preferred manner is an alarm level.

81. [Original] The apparatus as in claim 74, further comprising an alarm level setting.

82. [Previously Amended] The apparatus as in claim 81, wherein the microprocessor compares

the data received from the remote site monitoring device and the alarm level setting.

83. [Original] The apparatus as in claim 82, further comprising an alarm generator that produces an alarm in response to the data in the alarm level setting.

84. [Previously Amended] The apparatus as in claim 83, wherein the alarm generator is an electronic message.

85. [Original] The apparatus as in claim 83, wherein the alarm generator is an audio alarm.

86. [Previously Amended] The apparatus as in claim 73, wherein the remote site monitoring device is a telemetry radio system.

87. [Original] The apparatus as in claim 86, wherein the telemetry radio system comprises a plurality of sensors.

88. [Previously Amended] The apparatus as in claim 87, wherein the plurality of sensors are selected from the group consisting of digital and analog sensors.

89. [Original] The apparatus as in claim 87, wherein the plurality of sensors are compatible with a sensor protocol selected from the group consisting of serial data interface 12 (SDI-12), 12C, RS-232 and RS-432.

90. [Currently Amended] A method for retrieving and viewing data from a remote site monitoring device, the method comprising:

retrieving the data in at least one packet from the remote site monitoring system wherein the data is of an environmental nature;

storing the data of a storage device;

permitting remote access to the data; and

displaying the data in response to a request to access the data.

91. [Original] The method as in claim 90, further comprising displaying the data in a preferred status.

92. [Original] The method as in claim 90, further comprising setting an alarm level for the data.

93. [Original] The method as in claim 92, further comprising comparing the data to the alarm level to determine an alarm condition

94. [Original] The method as in claim 93, further comprising generating an alarm in response to the determination of the alarm condition.

95. [Currently Amended] A method for collecting sensor data from a remote sensor in conjunction with the telemetry radio, the method comprising:

retrieving the sensor data from a sensor wherein the sensor is of the type selected from the group consisting of a digital sensor and analog sensor and the data is of an environmental nature;

transmitting the data to a control board that is linked to the sensors;

processing the data into at least one packet; and

transmitting the at least one packet to a station.

96. [Previously Amended] The method as in claim 95, further comprising compressing the data by a microprocessor into a single data packet.